ANCHORAGE E GUADRANGLI

Bedrock geology by Sandra H. B. Clark

and Susan R. Bartsch, 1970. Contacts

of bedrock and surficial deposits by H.R. Schmoll and E. Dobrovolny, 1971.

ANCHOPACE BE ALASKA

## EXPLANATION

UNCONSOLIDATED DEPOSITS

Qs

Predominantly metagraywacke, siltite, and argillite flysch deposits; includes some calcareous metasandstones. Locally phyllitic. Generally medium to dark gray. Metamorphic assemblages of white mica, chlorite, epidote, and albite (greenschist facies?) are widespread. Pattern indicates areas of rusty to orange weathering!

Heterogeneous Assemblage Includes marine metaclastic and metavolcanic rocks. Predominantly metasandstone to metaconglomeratic sandstone; commonly quartz-poor, feldspathic to lithic; may include tuffaceous material. Characteristically massive, jagged outcrops; bedding commonly obscure to indistinguishable. Generally dark green to gray-green on weathered surfaces. Subordinate green stones (including basaltic and spilitic pillow lavas) usually associated with chert, cherty argillite, and argillite. May be part of a tectonically mixed mass of rocks which locally resembles a melange. Both clastic and volcanic sequences contain widespread prehnitepumpellyite facies metamorphic assemblages. The possibility that this unit is of early Tertiary age and that the contact with the Valdez (?) Group is not entirely a fault contact has not been ruled out, but is considered unlikely

predominantly massive, weakly meta-Sandstone

IGNEOUS ROCKS

Ultramafic rocks Predominantly peridotite (wehrlite), dunite, and pyroxenite. Most is weakly serpentinized; locally strongly

been edited or reviewed for conformity with U.S. Geological Survey standards and nomenclature

Surficial deposits

METAMORPHIC ROCKS

Valdez (?) Group

- Open dot pattern indicates known areas of

morphosed Sandstone and conglomeratic

- Open triangle pattern indicates known areas of predominantly greenstone, chert, cherty argillite, and argillite - Queried where doubtful

Greenschist, greenstone and gneiss Greenschist facies minerals, epidote, actinolite, chlorite, plagioclase, and quartz, are well-developed

Felsic to intermediate hypabyssal rocks. Dikes, oills, and small intrusive bodies. Most mapped from oir photos, some checked on ground

This map is preliminary and has not

SYMBOL5

Contact

==-................ Fault

Dashed where inferred, dotted where concealed, queried where hypothetical. Arrows show apparent relative horizontal movement

A A A A .. A ..

Probable thrust fault Sawteeth on upper plate; dotted where concealed

Air photo linear feature, thought to be a fault

Strike and dip of bedding

Strike of vertical bedding

Strike and dip of cleavage

Strike and dip of parallel bedding and cleavage

Strike of vertical cleavage

Approximate strike and dip of layering taken from aerial photographs (probably most are on cleavage)

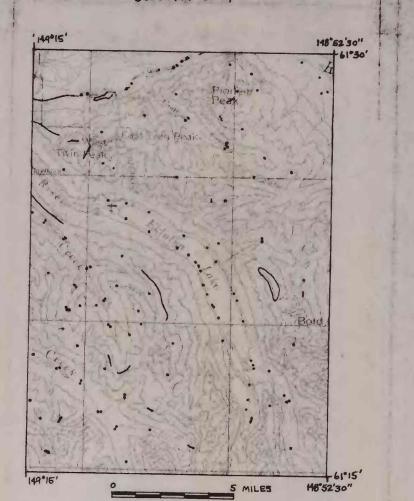
Lineation, showing plunge

Minor fold axis, showing plunge

Strike and dip of axial plane of minor fold

Horizontal axial plane of minor

Strike of vertical axial plane of



INDEX MAP SHOWING FIELD COVERAGE Foot traverses shown by lines; helicopter and vehicle stops shown by dots. Bedrock contacts and structures have been extended between field

Figure 1. Reconnaissance geologic map of the Anchorage B-6 quadrangle, Alaska.

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